Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:
Listing of Claims:

Claims 1-21. (Cancelled)

- Claim 22. (Currently amended) A method for diagnosing or monitoring multiple sclerosis (MS) in a mammal consisting of the steps:
- (a) obtaining a sample of body fluid from said mammal, wherein said body fluid includes is selected from the group consisting of, blood, blood products serum, plasma and saliva;
- (b) performing providing an enzyme-linked immunosorbent assay (ELISA) which [[binds]] has immobilized thereon myelin basic protein (MBP);
- (c) and characterized by utilizing mixing heparin with said body fluid prior to carrying out the ELISA to reduce non-specific charge interactions with MBP, thereby increasing sensitivity of said assay to about 77%;
- [[(c)]] (d) determining a level of at least one autoantibody selected from the group consisting of anti-MBP IgG, or a combination of anti-MBP IgM and anti-MBP IgM and a

Appl. No. 09/992,174 Reply to Office Action of April 10, 2007

thereof specific for said at least one autoantibody immobilized myelin basic protein in said sample; and,

[[(d)]] (e) comparing said level of said at least one autoantibody wherein said level is statistically significant, whereby a diagnosis or monitoring of MS in said mammal is made with a specificity of about 95% and a likelihood ratio (LR) value of about 14.8 with statistically significant levels thereof known to be indicative of diseased versus normal individuals, wherein a diagnosis of MS in said mammal is made.

Claim 23. (Previously presented) The method of claim 22, wherein said mammal is a human.

Claim 24. (Currently amended) The method of claim 22, wherein said diagnosis or monitoring is carried out on a single sample.

Claim 25. (Currently amended) The method of claim 22, wherein said diagnosis or monitoring is carried out on multiple samples such that at least one analysis is carried out on a first sample and at least another analysis is carried out on a second sample.

Appl. No. 09/992,174 Reply to Office Action of April 10, 2007

Claim 26. (Previously presented) The method of claim 25, wherein said first and second samples are obtained at different time periods.